

STATE OF ILLINOIS  
ILLINOIS COMMERCE COMMISSION

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APR 25 2006

Illinois Commerce Commission  
RAIL SAFETY SECTION

BOARD OF EDUCATION OF )  
GRAYSLAKE COMMUNITY HIGH )  
SCHOOL DISTRICT NO. 127, LAKE )  
COUNTY, ILLINOIS, )

Petitioner )

v. )

Case No. T05-0067 )

WISCONSIN CENTRAL RAILROAD, )  
a Subsidiary of CANADIAN )  
NATIONAL RAILWAY; and )  
VILLAGE OF GRAYSLAKE, )  
ILLINOIS, )

Respondents. )

Petition to interconnect traffic signal to )  
be installed at the following intersection )  
under the jurisdiction of the Village of )  
Grayslake, Illinois: Lake Street at )  
Hillside Avenuc. )

PETITIONER'S SUPPLEMENTAL EXHIBIT TO PETITION

AFFIDAVIT OF DR. MICHAEL G. ZELEK

I, MICHAEL G. ZELEK, Associate Superintendent for Business Affairs, for Petitioner Grayslake Community High School District No. 127, first being duly sworn, and on the basis of my personal knowledge, do hereby state:

1. I attended and testified at the February 9, 2006, hearing on District 127's Petition to Interconnect a Traffic Signal and Rail Crossing Protection System (the "Petition") on behalf of Grayslake Community High School District No. 127 (the "District").
2. I currently serve as the Associate Superintendent for Business Affairs to the District.



3. My office is currently located at the corner of Lake Street and Hillside Avenue, the intersection that is at issue in the pending Petition.

4. Also located at that intersection is the Central High School Campus for the District. The building is approximately 450,000 square feet, and sits on 25 acres. There are approximately 1750 students and 211 staff members on campus each day school is in session. Summary Information is attached hereto as Exhibit A.

5. My assistant, Pamela Podstawa, compiled the Summary Information attached as Exhibit A, based on the District's records at my direction. I have reviewed the summary information and it is complete and correct.

6. As with all schools, the safety of the students is of utmost importance. As an administrator at the District, ensuring the safety of our large student population is one of the most important duties assigned to my position.

7. In my capacity as Assistant Superintendent for Business Affairs for the District, I, as an agent of the Board of Education of Grayslake Community High School, authorized the Petition to Interconnect a Traffic Signal and Rail Crossing Protection Signal to be filed with the Illinois Commerce Commission (the "ICC").

8. I reviewed the Petition prior to its filing on December 21, 2005. The Petition seeks to interconnect a traffic light to be installed at the corner of Lake Street and Hillside Avenue with a railroad crossing signal located nearby. A true and correct copy of the Traffic Signal and Interconnect Installation Plan is attached hereto as Exhibit B.

9. Exhibit B to this Affidavit is the Traffic Signal and Interconnect Installation Plan (the "Plan"), which was prepared by Metro Transportation Group, at the District's request.



10. Metro Transportation Group is an engineering firm specializing in traffic engineering, transportation planning, and signal systems and design.

11. Based on my personal knowledge of the intersection and railroad crossing, the Plan depicts the conditions of the rail crossing as they will exist after work is completed, assuming the interconnection is approved.

12. The Plan accurately reflects the alignment of the crossing to Lake Street where it intersects. This crossing angle is 30°. It also reflects the double tracks that exist on the rail line. It also reflects the actual distance of the intersection at Lake and Hillside from the rail crossing.

13. At the hearing before the administrative law judge, he requested additional information regarding the following:

- A. costs associated with the interconnection of the traffic signal and rail crossing protection system,
- B. costs associated with the installation of the traffic signal,
- C. type of train traffic passing through the crossing, including the speed of the trains,
- D. the accident history at the crossing for the last ten years,
- E. crossing alignment,
- F. location of the school and park complexes to the crossing, and
- G. traffic accident history (including pedestrian incidents) around the crossing and location of the proposed traffic signal.

14. This Affidavit will set forth information to address each of the administrative law judges' concerns.

- A. Costs associated with the interconnection of the traffic signal and rail crossing protection system:



(1) The District has applied for a grant to assist with the costs associated with the interconnection of the traffic signal to the railroad signal. A true and correct copy of the Letter Related to Grade Crossing Protection Fund is attached hereto as Exhibit C.

(2) Exhibit C to this Affidavit is a true and correct copy of the letter that I received in late November 2005, from Michael Stead, related to the Grade Crossing Protection Fund (the "Letter").

(3) I received the letter pursuant to my application, on behalf of the District, for a grant from the Grade Crossing Protection Fund. The Letter was the Grade Crossing Protection Fund's response to my request.

(4) The Grade Crossing Protection Fund is a fund operated by the ICC that provides financial assistance to certain organizations that apply for such assistance for the purposes of improving safety at rail crossings.

(5) Based upon this letter, and my telephone discussions with representatives from the ICC, the Railroad, and Metro Transportation Group, the cost of the interconnection, including both parts and labor, is estimated to be approximately \$1,000, assuming that conditions and requirements related to the installation of the interconnection remain the same as at the time of the estimate. The cost may exceed \$1,000 if, upon the Illinois Commerce Commission's ("ICC") review of the project, the ICC determines that additional procedures need to be undertaken.

(6) The cost estimate is based upon a determination by a representative of Wisconsin Central Railroad, a subsidiary of Canadian National Railway ("WCR-



CNR”), and is dependant upon a recommended warning time of thirty-five (35) seconds.

(7) The warning time recommendation is based upon the train speed currently being between zero (0) and sixty (60) miles per hour and future maximum speed of seventy nine (79) miles per hour while intersecting Lake Street.

(8) According to WCR-CNR, to create a thirty-five (35) second warning, the sensors on the approach to the intersection will not need to be extended; and only a relay will need to be installed at the intersection. The relay will be wired to the existing railroad bungalow.

(9) The assistance provided by the grant described in Section 4(A)(2) above is not dependant upon the exact cost of the interconnection. The assistance provided is based on a percentage of the actual cost of the interconnection.

B. Costs Associated with the installation of the traffic signal:

(1) The cost of constructing the traffic signal is estimated to be approximately \$117,000.

(2) The District will assume the cost of the installation of the traffic signal.

C. Railroad traffic and crossing information:

(1) The railroad crosses Lake Street at a thirty (30) degree angle, 203 feet north of the Lake Street and Hillside intersection. See, Exhibit B.

(2) The reported speed of the trains currently ranges from zero (0) miles per hour to sixty (60) miles per hour with a reported future maximum speed of seventy nine (79) miles per hour. A true and accurate copy of the U.S. DOT - Crossing Inventory Information As of 2/10/2006 is attached hereto as Exhibit D.



(3) The Inventory documents the location of the rail crossing and the classification of the crossing assigned by the U.S. Department of Transportation, information related to train speed and traffic, information related to traffic control, information related to the physical characteristics of the tracks, and information related to the highway traffic.

(4) According to the U.S. DOT Crossing Inventory for the crossing, approximately sixty (60) trains pass through the location set forth in Statement No. 4(C)(1), above, every weekday. According to reports from WCR-CNR, approximately 20 of the trains carry passengers and 40 of the trains carry freight. See, Exhibit D.

D. Accident history at train crossing:

(1) According to the U.S. DOT Crossing Inventory for the crossing, there have been two reported accidents at this Highway-Rail Grade crossing, one on October 26, 1979, and another on July 2, 1989. See, Exhibit D.

E. Crossing Alignment:

(1) The railroad crosses the Lake Street at a thirty (30) degree angle, 203 feet north of the Lake Street and Hillside intersection. See, Exhibit A.

(2) There are double railroad tracks at the crossing. See, Exhibit A.

F. Location of train crossing:

(1) The train crossing, as stated above, is 203 feet from an intersection where the intersecting streets run alongside a high school building. True and correct copies of the Aerial Photographs of Grade Crossing, Intersection, and School Building, are attached hereto as Group Exhibit E.



(2) The Photographs accurately depict the location and conditions around the rail crossing, school property, and intersection.

(3) There is a parking lot on north side of Hillside Avenue and west side of Lake Street that serves a municipal park. This is the side of the intersection nearest to the train crossing. Across Hillside Avenue from this parking lot is a high school building, and its own, adjacent parking lot. See, Exhibit E.

G. Accident history at the corner of Lake Street and Hillside Avenue, including pedestrian accidents:

(1) According to records received from the Village of Grayslake, Illinois, from 2002 through 2006, a total of 52 automobile accidents occurred in the parking lots adjacent to the park (cited above) and the high school (also cited above). True and correct copies of the Traffic Reports and Summary Sheet of Accidents Near Lake Street and Hillside, attached hereto as Group Exhibit F.

(2) Exhibit F is the group exhibit of Traffic Reports and Summary Sheet of Accidents (the "Reports") near Lake Street and Hillside, obtained from the Village of Grayslake pursuant to a *Freedom of Information Act* Request which I submitted to the Village.

(3) Pursuant to the certification received with the reports, they were prepared by Joan H. Anness.

(4) I obtained the reports immediately following their certification date of February 22, 2006.



(5) In the time period set forth above, forty one automobile accidents occurred on the roadways in the area described above are reported by the Village of Grayslake. See, Group Exhibit F.

(6) Reportedly, six of the automobile accidents involved pedestrians. See, Group Exhibit F.

H. Other Information:

(1) According to the U.S. Department of Transportation Crossing Inventory, approximately 12,100 vehicles entered the rail crossing per day in the year 2000. See, Exhibit C.

(2) Although the U.S. Department of Transportation Crossing Inventory indicates that zero school buses entered the rail crossing, on school days school buses regularly enter the crossing.

(3) In attempting to accurately assess traffic at the intersection of Lake Street and Hillside Avenue, this Affiant reviewed printouts displaying an analysis by Metro Transportation Group, related to the traffic at the intersection of Lake Street and Hillside Avenue (the "Printouts"), the site of the proposed traffic signal.

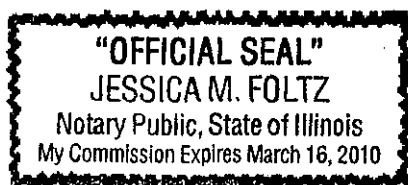
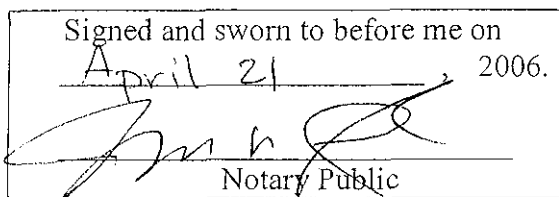
(4) These Printouts were obtained from Metro Transportation Group, approximately March 10, 2006.

(5) The copies of the Printouts, attached hereto as Exhibit G, are true and accurate copies of the Printouts that I received from Metro Transportation Group.



Affiant Further Saith Not.

Dated: April 21, 2006.



A. Lynn Himes, Esq.  
Kevin B. Gordon, Esq.  
Jessica M. Foltz, Esq.  
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180 North Stetson  
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Respectfully submitted by,  
Dr. Michael G. Zelek, Associate Superintendent  
for Business Affairs, on behalf of Board of  
Education of Grayslake Community High School  
District 127, Lake County, Illinois

  
DR. MICHAEL G. ZELEK



**STATE OF ILLINOIS  
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**NOTICE OF FILING**

PLEASE TAKE NOTICE that on this 21<sup>st</sup> day of April, 2006, Jessica M. Foltz caused to be filed with the Illinois Commerce Commission, the Supplemental Exhibit to Petition, an Affidavit of Dr. Michael G. Zelek, on behalf of the Board of Education of Grayslake Community High School District No. 127, Lake County, Illinois.

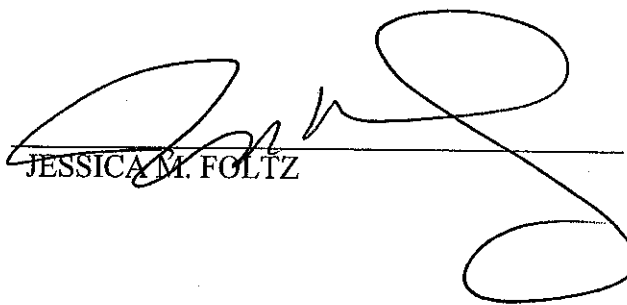
  
JESSICA M. FOLTZ  
Attorney for Board of Education of  
Grayslake Community High School District  
No. 127, Lake County, Illinois

A. LYNN HIMES, ESQ.  
KEVIN B. GORDON, ESQ.  
JESSICA M. FOLTZ, ESQ.  
SCARIANO, HIMES AND PETRARCA, CHTD.  
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[jfoltz@edlawyer.com](mailto:jfoltz@edlawyer.com)



**CERTIFICATE OF SERVICE**

I, Jessica M. Foltz, an attorney hereby certify that I served a copy of the attached Supplemental Exhibit to Petition Affidavit of Dr. Michael G. Zelek, on the persons identified on the attached service list the by U.S. Mail, properly addressed, with postage fully prepaid thereon, from the post office box located at 180 N. Stetson, Chicago, IL 60601, on April 21<sup>st</sup>, 2006.



JESSICA M. FOLTZ



## SERVICE LIST

Mr. Michael J. Barron, Jr.  
Wisconsin Central Railroad, a Subsidiary of Canadian National Railway  
Fletcher & Sippel, LLC  
29 N. Wacker Drive, Suite 920  
Chicago, IL 60602

Mr. Timothy R. Perry  
Village President  
Village of Grayslake  
10 South Seymour Avenue  
Grayslake, IL 60030-0325

Ms. Joanne W. Lawrence  
Village Clerk  
Village of Grayslake  
10 South Seymour Avenue  
Grayslake, IL 60030-0325

Mr. Dan Powers  
c/o The Illinois Commerce Commission  
527 E. Capital Avenue  
Springfield, IL 62707



Grayslake Community High School District 127

Central High School  
400 N. Lake Street  
Grayslake, IL 60030

Building Size: 450,000 sq. ft.

Building Hours: 7:30 a.m. to 2:45 p.m. for school  
7:30 a.m. to 4:00 p.m. for office staff  
after 2:45 p.m. for after school sports practice

Campus Size: 25 acres

The School also utilizes Central Park which is a Grayslake Park District facility for lower levels of football, soccer, lacrosse, softball, baseball practice and games; and all levels of cross country practice and games.

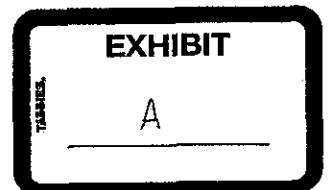
To reach Central Park, students must cross Lake Street at the intersection of Lake and Hillside, then cross two sets of railroad tracks that are utilized heavily for passenger and freight train service.

See Attachment "A" for the 2005-06 athletic schedule.

Staff Size: 211 staff members including 18 teachers who travel between campuses during the day.

Student Size: Approximately 1750 students

Central High School Parking lot is also heavily utilized by patrons attending Grayslake Park District functions at Central Park. See Attachment B for list of Park District activities at Central Park.





# **Grayslake Central High School** **Events for 8/22/2005 to 6/10/2006**

<u>Day</u>	<u>Date</u>	<u>Sport</u>	<u>Opponent</u>	<u>Place</u>	<u>Time</u>
Monday	09/05/05		LABOR DAY-NO SCHOOL (School)		
Saturday	09/24/05		HOMECOMING (School)	Home	
Monday	10/10/05		NO SCHOOL-COLUMBUS DAY (School)		
Friday	10/21/05		Cross Country (School)	Away	3:00PM
Thursday	10/27/05		Sectional Course Preview Run - Cross Country (School)	Away	2:45PM
Saturday	10/29/05		Colts Football Playoffs (School)	Home	9:00AM
Sunday	10/30/05		Colts Football Playoffs (School)	Home	9:00AM
Sunday	11/06/05		Cheerleading Colts Competition (School)		7:00AM
Tuesday	11/15/05		Bowen Travel Bball (School)	Home	7:30PM
Wednesday	11/16/05		Bowen Travel Bball (School)	Home	7:30PM
Thursday	11/17/05		Bowen Travel Bball (School)	Home	7:30PM
Saturday	11/19/05		Bowen Travel Bball (School)	Home	2:00PM
Sunday	11/27/05		Diamond BA Academy (School)	Home	2:00PM
Sunday	11/27/05		Diamond BA Academy (School)	Home	2:00PM
Sunday	11/27/05		Diamond BA Academy (School)	Home	4:00PM
Tuesday	11/29/05		Intramural Basketball (School)	Home	6:00PM
Tuesday	12/06/05		Intramural Basketball (School)	Home	6:00PM
Tuesday	12/13/05		Intramural Basketball (School)	Home	6:00PM
Monday	12/19/05		AED Training - Chamernik (School)	Home	7:00AM
Tuesday	12/27/05		GCHS Baseball Winterfest (School)	Home	10:00AM
Tuesday	12/27/05		GCHS Baseball Winterfest (School)	Home	10:00AM
Tuesday	12/27/05		GCHS Baseball Winterfest (School)	Home	1:30PM
Wednesday	12/28/05		GCHS Baseball Winterfest (School)	Home	10:00AM
Wednesday	12/28/05		GCHS Baseball Winterfest (School)	Home	10:00AM
Wednesday	12/28/05		GCHS Baseball Winterfest (School)	Home	1:30PM
Thursday	12/29/05		GCHS Baseball Winterfest (School)	Home	10:00AM
Thursday	12/29/05		GCHS Baseball Winterfest (School)	Home	10:00AM
Thursday	12/29/05		GCHS Baseball Winterfest (School)	Home	1:30PM
Monday	01/02/06		Diamond BA Acad. - FH, BG, SG (School)	Home	1:00PM
Sunday	01/08/06		GYBA - Troy Whalen (School)	Home	10:00AM
Sunday	01/08/06		GYBA - Troy Whalen (School)	Home	10:00AM
Tuesday	01/10/06		Basketball - 8th grade travel team (School)		7:35PM
Wednesday	01/11/06		Freshmen Activities Fair (School)	Home	3:00PM
Wednesday	01/11/06		Freshmen Orientation (School)	Home	6:00PM
Sunday	01/15/06		GYBA - Troy Whalen (School)	Home	9:00AM
Sunday	01/15/06		GYBA - Troy Whalen (School)	Home	9:00AM
Monday	01/16/06	Boys V Basketball	Basketball - 8th grade travel team (School)	Home	2:00PM
Monday	01/16/06		Intramural Basketball (School)	Home	6:00PM
Wednesday	01/18/06	Boys V Basketball	Basketball - 8th grade travel team (School)	Home	7:30PM
Sunday	01/22/06		GYBA - Troy Whalen (School)	Home	9:00AM
Sunday	01/22/06		GYBA - Troy Whalen (School)	Home	9:00AM
Monday	01/23/06	Boys V Basketball	Basketball - 8th grade travel team (School)	Home	7:35PM
Wednesday	01/25/06		Intramural Basketball (School)	Home	6:00PM
Friday	01/27/06		Pack the Place Tailgate Party (School)	Home	3:00PM
Sunday	01/29/06		GYBA - Troy Whalen (School)	Home	9:00AM
Sunday	01/29/06		GYBA - Troy Whalen (School)	Home	9:00AM
Wednesday	02/01/06		Route 83 Showdown (School)	Home	6:00PM
Sunday	02/05/06		GYBA - Troy Whalen (School)	Home	9:00AM
Sunday	02/05/06		GYBA - Troy Whalen (School)	Home	9:00AM
Monday	02/06/06		5th grade travel basketball team (School)		7:15PM
Tuesday	02/07/06		Intramural Basketball (School)	Home	6:00PM



Saturday	02/11/06	7th Grade BK Traveling Team (School)	Home	9:00AM
Sunday	02/12/06	GYBA - Troy Whalen (School)	Home	9:00AM
Sunday	02/12/06	GYBA - Troy Whalen (School)	Home	9:00AM
Monday	02/13/06	7th Grade BK Traveling Team (School)	Home	6:30PM
Monday	02/13/06	Intramural Basketball (School)	Home	7:00PM
Wednesday	02/15/06	Intramural Basketball (School)	Home	7:00PM
Thursday	02/16/06	Dodge Ball Tourney (School)	Home	5:00PM
Thursday	02/16/06	Dodge Ball Tourney (School)	Home	5:00PM
Thursday	02/16/06	Dodge Ball Tourney (School)	Home	5:00PM
Friday	02/17/06	Dodge Ball Tourney (School)	Home	5:00PM
Friday	02/17/06	Dodge Ball Tourney (School)	Home	5:00PM
Friday	02/17/06	Dodge Ball Tourney (School)	Home	5:00PM
Saturday	02/18/06	Troy Whalen (School)	Home	5:00PM
Sunday	02/19/06	GYBA Tryouts (School)	Home	9:00AM
Sunday	02/19/06	GYBA Tryouts (School)	Home	9:00AM
Sunday	02/19/06	GYBA Tryouts (School)	Home	9:00AM
Monday	02/20/06	Diamond BA Academy (School)	Home	1:00PM
Monday	02/20/06	Diamond BA Academy (School)	Home	1:00PM
Monday	02/20/06	Diamond BA Academy (School)	Home	1:00PM
Monday	02/20/06	7th Grade BK Travelling Team (School)	Home	6:30PM
Tuesday	02/21/06	Intramurals Basketball (School)		6:00PM
Thursday	02/23/06	5th grade travel basketball team (School)		7:15PM
Friday	02/24/06	Men's Baseball Practice (School)	Home	7:30PM
Saturday	02/25/06	7th Grade BK Travelling Team (School)	Home	9:00AM
Saturday	02/25/06	GYBA Tryouts (School)	Home	1:00PM
Saturday	02/25/06	GYBA Tryouts (School)	Home	1:00PM
Saturday	02/25/06	GYBA Tryouts (School)	Home	3:00PM
Sunday	02/26/06	GYBA - Troy Whalen (School)	Home	10:00AM
Sunday	02/26/06	GYBA - Troy whalen (School)	Home	10:00AM
Friday	03/03/06	Park District Bball Tourney (School)	Home	5:00PM
Friday	03/03/06	Park District Bball Tourney (School)	Home	5:00PM
Saturday	03/04/06	Park District Bball Tourney (School)	Home	7:00AM
Saturday	03/04/06	Park District Bball Tourney (School)	Home	7:00AM
Saturday	03/04/06	Park District Bball Tourney (School)	Home	7:00AM
Sunday	03/05/06	Park District Bball Tourney (School)	Home	7:00AM
Sunday	03/05/06	Park District Bball Tourney (School)	Home	7:00AM
Friday	03/10/06	Spring Pictures (School)	Home	3:00PM
Friday	03/10/06	TWIRP (School)		5:00PM
Saturday	03/11/06	Softball Parent Meeting (School)	Home	TBA
Saturday	03/11/06	TWIRP (School)		8:00AM
Sunday	03/12/06	GYBA - Troy Whalen (School)	Home	11:00AM
Sunday	03/12/06	GYBA - Troy Whalen (School)	Home	11:00AM
Sunday	03/12/06	GYBA - Troy Whalen (School)	Home	3:00PM
Sunday	03/12/06	GYBA - Troy Whalen (School)	Home	3:00PM
Wednesday	03/15/06	Winter Sports Awards (School)	Home	6:30PM
Wednesday	03/15/06	Winter Sports Awards (School)	Home	6:30PM
Wednesday	03/15/06	Winter Sports Awards (School)	Home	6:30PM
Wednesday	03/15/06	Winter Sports Awards (School)	Home	6:30PM
Wednesday	03/15/06	Winter Sports Awards (School)	Home	6:30PM
Wednesday	03/15/06	Winter Sports Awards (School)	Home	6:30PM
Friday	03/17/06	Hoopfest Basketball Tournament (Boosters) (School)	Home	4:00PM
Friday	03/17/06	Hoopfest Basketball Tournament (Boosters) (School)	Home	4:00PM
Friday	03/17/06	Hoopfest Basketball Tournament (Boosters) (School)	Home	4:00PM
Saturday	03/18/06	Hoopfest Basketball Tournament (Boosters) (School)	Home	8:00AM
Saturday	03/18/06	Hoopfest Basketball Tournament (Boosters) (School)	Home	8:00AM



Saturday	03/18/06	Hoopfest Basketball Tournament (Boosters) (School)	Home	8:00AM
Sunday	03/19/06	Hoopfest Basketball Tournament (Boosters) (School)	Home	8:00AM
Sunday	03/19/06	Hoopfest Basketball Tournament (Boosters) (School)	Home	8:00AM
Sunday	03/19/06	Hoopfest Basketball Tournament (Boosters) (School)	Home	8:00AM
Sunday	03/26/06	GYBA - Troy Whalen (School)	Home	11:00AM
Sunday	03/26/06	GYBA - Troy Whalen (School)	Home	3:00PM
Friday	04/21/06	Incoming 8th grade Dance (School)	Home	5:00PM
Friday	04/28/06	Incoming 8th grade Dance (School)	Home	5:00PM
Sunday	05/07/06	Meadowview School Walk-a-thon (School)	Home	8:00AM
Tuesday	05/30/06	Central HS Spring Sports Awards Night (School)	Home	6:30PM
Tuesday	05/30/06	Central HS Spring Sports Awards Night (School)	Home	6:30PM
Tuesday	05/30/06	Central HS Spring Sports Awards Night (School)	Home	6:30PM
Tuesday	05/30/06	Central HS Spring Sports Awards Night (School)	Home	6:30PM
Tuesday	05/30/06	Central HS Spring Sports Awards Night (School)	Home	6:30PM
Tuesday	06/06/06	Boys Basketball Summer Camp (School)	Home	7:30AM
Wednesday	06/07/06	Boys Basketball Summer Camp (School)	Home	7:30AM
Thursday	06/08/06	Boys Basketball Summer Camp (School)	Home	7:30AM
<hr/>				
Sunday	11/20/05	Chinese School (Other)		1:00PM
Sunday	11/20/05	Park Dist Adult Badminton (Other)	Home	1:00PM
Sunday	11/27/05	Park Dist Open Gym (Other)	Home	8:30AM
Sunday	11/27/05	Park Dist Adult Badminton (Other)	Home	1:00PM
Wednesday	11/30/05	Park District Travelling BK (Other)	Home	7:30PM
Saturday	12/03/05	Park District Travelling BK (Other)	Home	1:30PM
Sunday	12/04/05	Park Dist Open Gym (Other)	Home	9:00AM
Sunday	12/04/05	Chinese School (Other)		1:00PM
Sunday	12/04/05	Park Dist Adult Badminton (Other)	Home	1:00PM
Monday	12/05/05	Park District Travelling BK (Other)	Home	7:30PM
Wednesday	12/07/05	Park District Travelling BK (Other)	Home	7:30PM
Thursday	12/08/05	Park District Travelling BK (Other)	Home	7:30PM
Sunday	12/11/05	Park Dist Open Gym (Other)	Home	9:00AM
Sunday	12/11/05	Chinese School (Other)		1:00PM
Sunday	12/11/05	Park Dist Adult Badminton (Other)	Home	1:00PM
Monday	12/12/05	Park District Travelling BK (Other)	Home	7:30PM
Thursday	12/15/05	Park District Travelling BK (Other)	Home	7:30PM
Sunday	12/18/05	Park Dist Open Gym (Other)	Home	9:00AM
Sunday	12/18/05	Basketball - 8th grade travel team (Other)	Home	11:00AM
Sunday	12/18/05	Chinese School (Other)		1:00PM
Sunday	12/18/05	Park Dist Adult Badminton (Other)	Home	1:00PM
Monday	12/19/05	Park District Traveling BK (Other)	Home	2:00PM
Wednesday	12/21/05	Park District Traveling BK (Other)	Home	2:00PM
Thursday	12/22/05	Park District Travelling BK (Other)	Home	2:00PM
Friday	12/23/05	Basketball - 8th grade travel team (Other)	Home	10:00AM
Friday	12/23/05	Park District Travelling BK (Other)	Home	2:00PM
Sunday	01/01/06	Park District Travelling BK (Other)	Home	2:00PM
Sunday	01/08/06	Park Dist Open Gym (Other)	Home	9:00AM
Sunday	01/08/06	Park Dist Men's Basketball (Other)	Home	2:00PM
Sunday	01/15/06	Park Dist Open Gym (Other)	Home	9:00AM
Sunday	01/15/06	Park Dist Men's Basketball (Other)	Home	2:00PM
Sunday	01/22/06	Park Dist Open Gym (Other)	Home	9:00AM
Sunday	01/22/06	Park Dist Men's Basketball (Other)	Home	2:00PM
Sunday	01/29/06	Park Dist Open Gym (Other)	Home	9:00AM
Sunday	01/29/06	Park Dist Men's Basketball (Other)	Home	2:00PM
Sunday	02/05/06	Park Dist Open Gym (Other)	Home	9:00AM
Thursday	02/09/06	CLC Swordsmanship (Other)	Home	7:00PM

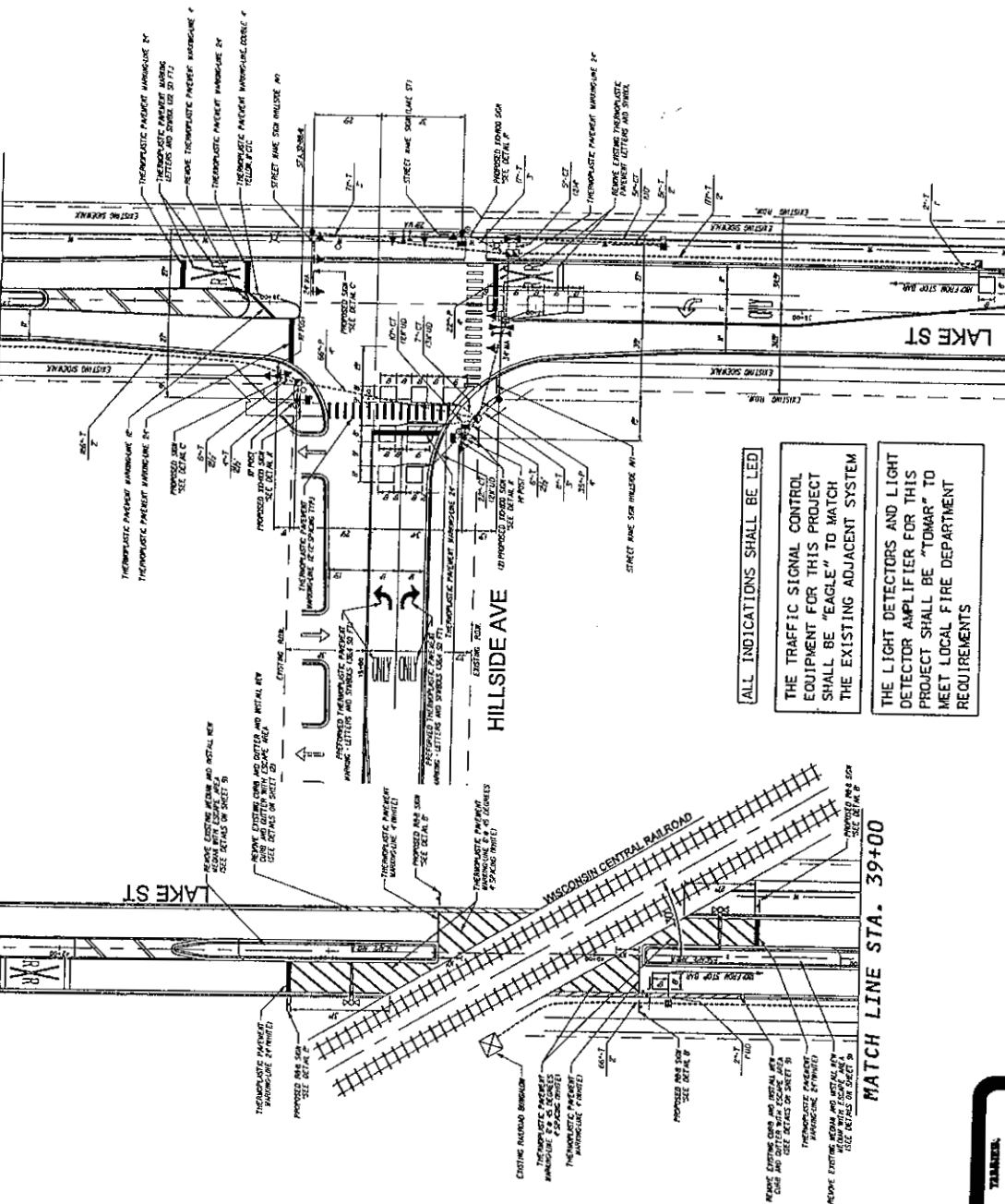


Sunday	02/12/06		Park Dist Open Gym (Other)	Home	9:00AM
Sunday	02/12/06		Park Dist Men's Basketball (Other)	Home	2:00PM
Sunday	02/19/06		Park Dist Open Gym (Other)	Home	9:00AM
Sunday	02/19/06		Park Dist Men's Basketball (Other)	Home	2:00PM
Monday	02/20/06		Illinois HoopStars Tryouts (Other)	Home	6:00PM
Monday	02/20/06		Illinois HoopStars Tryouts (Other)	Home	6:00PM
Sunday	02/26/06		Park Dist Men's Basketball (Other)	Home	2:00PM
Tuesday	03/07/06		Illinois HoopStars Tryouts (Other)	Home	7:30PM
Thursday	03/09/06		Park District Basketball (Other)	Home	7:00PM
Thursday	03/09/06		Illinois HoopStars Tryouts (Other)	Home	7:30PM
Sunday	03/12/06		Park Dist Open Gym (Other)	Home	9:00AM
Sunday	03/12/06		Park Dist Men's Basketball (Other)	Home	2:00PM
Tuesday	03/21/06		Illinois HoopStars Tryouts (Other)	Home	7:30PM
Thursday	03/23/06		Illinois HoopStars Tryouts (Other)	Home	7:30PM
Sunday	03/26/06		Park Dist Open Gym (Other)	Home	9:00AM
Sunday	03/26/06		Park Dist Men's Basketball (Other)	Home	2:00PM
Sunday	04/02/06		Park Dist Open Gym (Other)	Home	9:00AM
Tuesday	04/04/06		Illinois HoopStars (Other)	Home	6:00PM
Wednesday	04/05/06		Illinois HoopStars (Other)	Home	6:00PM
Thursday	04/06/06		Illinois HoopStars (Other)	Home	6:00PM
Sunday	04/09/06		Park Dist Open Gym (Other)	Home	9:00AM
Tuesday	04/11/06		Illinois HoopStars (Other)	Home	6:00PM
Wednesday	04/12/06		Illinois HoopStars (Other)	Home	6:00PM
Thursday	04/13/06		Illinois HoopStars (Other)	Home	6:00PM
Saturday	04/15/06		Police/Fire Basketball Game (Other)	Home	5:00PM
Tuesday	04/18/06		Illinois HoopStars (Other)	Home	6:00PM
Thursday	04/20/06		Illinois HoopStars (Other)	Home	6:00PM
Sunday	04/23/06		Park Dist Open Gym (Other)	Home	9:00AM
Sunday	04/30/06		Park Dist Open Gym (Other)	Home	9:00AM
Tuesday	05/02/06		Illinois HoopStars (Other)	Home	6:00PM
Wednesday	05/03/06		Illinois HoopStars (Other)	Home	6:00PM
Thursday	05/04/06		Illinois HoopStars (Other)	Home	6:00PM
Sunday	05/07/06		Park Dist Open Gym (Other)	Home	9:00AM
Monday	05/08/06		Illinois HoopStars (Other)	Home	6:00PM
Friday	05/12/06		Illinois HoopStars (Other)	Home	6:00PM
Sunday	05/14/06		Park Dist Open Gym (Other)	Home	9:00AM
Tuesday	05/16/06		Illinois HoopStars (Other)	Home	6:00PM
Wednesday	05/17/06		Illinois HoopStars (Other)	Home	6:00PM
Thursday	05/18/06		Illinois HoopStars (Other)	Home	6:00PM
Sunday	05/21/06		Park Dist Open Gym (Other)	Home	9:00AM
Tuesday	05/23/06		Illinois HoopStars (Other)	Home	6:00PM
Wednesday	05/24/06		Illinois HoopStars (Other)	Home	6:00PM
Thursday	05/25/06		Illinois HoopStars (Other)	Home	6:00PM
Sunday	05/28/06		Park Dist Open Gym (Other)	Home	9:00AM
Tuesday	06/06/06		Illinois HoopStars (Other)	Home	6:00PM
Wednesday	06/07/06		Illinois HoopStars (Other)	Home	6:00PM
Thursday	06/08/06		Illinois HoopStars (Other)	Home	6:00PM
<hr/>					
Monday	08/22/05	Boys V Golf	Lake County Invite - 10th Place	Home	8:00AM
Tuesday	08/23/05	Boys JV Golf	Zion-Benton Township High School	Home	4:30PM
Tuesday	08/23/05	Girls V Tennis	Zion-Benton Township High School	Home	4:30PM
Tuesday	08/23/05	Girls JV Tennis	Zion-Benton Township High School	Away	4:30PM
Wednesday	08/24/05	Boys V Golf	* Woodstock High School	Home	4:30PM
Wednesday	08/24/05	Boys JV Golf	* Woodstock High School	Home	4:30PM
Thursday	08/25/05	Boys V Golf	* Crystal Lake South High School	Home	4:30PM



Thursday	08/25/05	Boys JV Golf	* Crystal Lake South High School	Home	4:30PM
Thursday	08/25/05	Girls V Tennis	Mundelein High School	Away	4:30PM
Thursday	08/25/05	Girls JV Tennis	Mundelein High School	Home	4:30PM
Friday	08/26/05	Boys V Soccer	Antioch Community High School	Away	4:30PM
Friday	08/26/05	Boys FC Soccer	Zion-Benton Township High School	Home	4:30PM
Friday	08/26/05	Boys JC Soccer	Zion-Benton Township High School	Away	4:30PM
Friday	08/26/05	Boys JN Soccer	Antioch Community High School	Away	4:30PM
Friday	08/26/05	Boys SN Football	* Crystal Lake South High School	Away	5:30PM
Friday	08/26/05	Boys V Football	* Crystal Lake South High School	Away	7:45PM
Saturday	08/27/05	Boys FN Football	* Crystal Lake South High School	Home	9:00AM
Saturday	08/27/05	Girls V Tennis	McHenry/Johnsburg invite Placed 5th	Away	9:00AM
Monday	08/29/05	Boys V Golf	Barrington Invite - 12th Place	Away	1:00PM
Monday	08/29/05	Boys SC Football	* Crystal Lake South High School	Home	4:30PM
Monday	08/29/05	Boys FC Football	* Crystal Lake South High School	Home	4:30PM
Monday	08/29/05	Boys JV Golf	Vernon Hills High School	Away	4:30PM
Monday	08/29/05	Boys V Soccer	Lakes Community High School	Away	4:30PM
Monday	08/29/05	Boys FN Soccer	Libertyville High School	Away	4:30PM
Monday	08/29/05	Boys JC Soccer	Lakes Community High School	Away	4:30PM
Tuesday	08/30/05	Boys V Cross Country	Lake County Invite (Hosted by Grant HS)	Away	3:30PM
Tuesday	08/30/05	Girls V Cross Country	Lake County Invite (Hosted by Grant HS)	Away	3:30PM
Tuesday	08/30/05	Boys V Golf	* Prairie Ridge High School	Away	4:30PM
Tuesday	08/30/05	Boys JV Golf	* Prairie Ridge High School	Away	4:30PM
Tuesday	08/30/05	Boys V Soccer	Glenbrook Invite vs. Fremd	Away	5:30PM
Wednesday	08/31/05	Boys V Golf	Wauconda - Tri-Match @ Steeple Chase	Away	4:30PM
Wednesday	08/31/05	Boys V Golf	Mundelein - Tri-Match @ Steeple Chase	Away	4:30PM
Wednesday	08/31/05	Boys JV Golf	Mundelein - Tri-Match @ Renwood CC	Home	4:30PM
Wednesday	08/31/05	Boys JV Golf	Wauconda - Tri-Match @ Renwood CC	Home	4:30PM
Wednesday	08/31/05	Boys V Soccer	Glenbrook Invite vs. Glenbrook South HS	Away	5:30PM
Thursday	09/01/05	Boys JN Soccer	Zion-Benton Township High School	Home	4:30PM
Thursday	09/01/05	Girls V Tennis	Vernon Hills High School	Away	4:30PM
Thursday	09/01/05	Girls JV Tennis	Vernon Hills High School	Home	4:30PM
Thursday	09/01/05	Girls JV Volleyball	McHenry Comm High School (Game 1)	Away	5:00PM
Thursday	09/01/05	Boys V Soccer	Glenbrook Invite vs. Leyden HS	Away	5:30PM
Thursday	09/01/05	Girls SC Volleyball	McHenry Comm High School	Away	5:30PM
Thursday	09/01/05	Girls FC Volleyball	McHenry Comm High School	Away	6:00PM
Thursday	09/01/05	Girls V Volleyball	McHenry Comm High School	Away	6:30PM
Friday	09/02/05	Boys FC Soccer	Cary-Grove Frosh Jamboree	Away	4:30PM
Friday	09/02/05	Boys FC Soccer	Cary-Grove Frosh Jamboree	Away	4:30PM
Friday	09/02/05	Boys SN Football	* Huntley High School	Home	5:30PM
Friday	09/02/05	Boys V Football	* Huntley High School	Home	7:45PM
Saturday	09/03/05	Boys V Soccer	Glenbrook South Invite vs. Mather	Away	TBA
Saturday	09/03/05	Girls JV Tennis	Mundelein Invite	Away	8:00AM
Saturday	09/03/05	Girls V Volleyball	Ram Slam vs. Richmond-Burton	Home	8:00AM
Saturday	09/03/05	Girls V Volleyball	Ram Slam vs Johnsburg	Home	8:00AM
Saturday	09/03/05	Girls V Volleyball	Ram Slam vs Marian Central	Home	8:00AM
Saturday	09/03/05	Girls V Volleyball	Ram Slam vs N. Chicago	Home	8:00AM
Saturday	09/03/05	Girls V Volleyball	Ram Slam vs DeKalb - 4th Place	Home	8:00AM
Saturday	09/03/05	Boys FN Football	* Huntley High School	Away	9:00AM
Saturday	09/03/05	Boys FN Soccer	Cary-Grove Frosh Jamboree vs Dundee-Crown	Away	9:00AM
Saturday	09/03/05	Boys FN Soccer	Cary-Grove Frosh Jamboree vs Huntley	Away	9:00AM
Monday	09/05/05	Boys FC Football	* Huntley High School	Away	9:00AM
Monday	09/05/05	Boys SC Football	Lake Zurich High School	Away	9:30AM
Tuesday	09/06/05	Boys V Cross Country	* Quad @ C. Lake South (McHenry Jacobs)	Away	4:30PM
Tuesday	09/06/05	Girls V Cross Country	* Quad @ C. Lake South (McHenry Jacobs)	Away	4:30PM
Tuesday	09/06/05	Boys V Golf	* H D Jacobs High School	Away	4:30PM

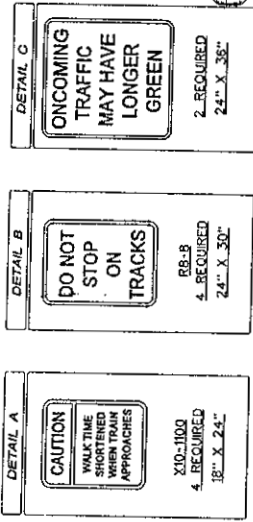





THE LIGHT DETECTORS AND LIGHT  
DETECTOR AMPLIFIER FOR THIS  
PROJECT SHALL BE "TOMAR" TO  
MEET LOCAL FIRE DEPARTMENT  
REQUIREMENTS

SCALE: 1"=20'

CONTROLLER	PRECEDENCE	PRIORITY
SERVICE INSTALLATION		
SIGNAL VISA		
SIGNAL VISA WITH BACKUP/LANE		
SIGNAL VISA, PRESTELLA		
SIGNAL POST		
WAST AND ACCIDENT AND POLE, STEEL		
WAST AND ACCIDENT AND POLE, ALUMINUM		
COMMON TRUCK		
UNIT BUS		
NAVPOLE		
HEAVY WPT NAVPOLE		
DOUBLE NAVPOLE		
6.1.1. CONDUCT IN TRUCK OR PAPER		
PRESTELLA NAVPOLE DETECTOR		
PRECEDENCE		
PRIORITY		



RESTORATION OF WORK AREA. RESTORATION OF THE TRAFFIC SIGNAL WORK AREA SHALL BE INCIDENTAL TO THE RELATED PITS SUCH AS FORMATION, CURB, GUTTER, TRENCH, AND DRAINAGE, ETC., AND NO EXTRA COMPENSATION SHALL BE ALLOWED. ALL TRAFFIC SURFACES SUCH AS BRICKWORK, MORTAR, THERMAL, PAVEMENT, ETC., SHALL BE REPLACED IN KIND. ALL MATERIAL TO BE USED SHALL BE REPLACED WITH AN EQUIVALENT AND ALL MATERIAL TO BE USED SHALL BE STORED IN ACCORDANCE WITH STANDARD SPECIFICATIONS 252 AND 250 RESPECTIVELY.

<div></div> <div><b>METRO TRANSPORTATION GROUP, INC.</b> TRAFFIC ENGINEERING, TRANSPORTATION PLANNING AND SIGNAL SYSTEMS/DESIGN 3100 W. HIGGINS ROAD, HOFFMAN ESTATES, IL 60195 PH# 630 213-1000</div>	<b>REVISIONS</b>																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																					
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**EXHIBIT**

B

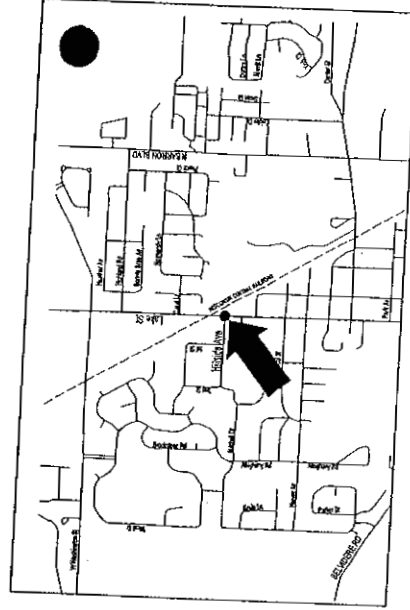
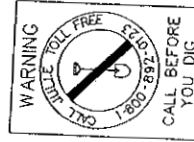


# TRAFFIC SIGNAL INSTALLATION and INTERCONNECT PLAN

## LAKE STREET @ HILLSIDE AVENUE GRAYSLAKE, ILLINOIS

### INDEX

1. TITLE SHEET
- 2-5. ILLINOIS DEPARTMENT OF TRANSPORTATION  
DISTRICT 1 STANDARD TRAFFIC SIGNAL  
DESIGN DETAILS
6. TRAFFIC SIGNAL AND RAILROAD INTERCONNECT  
INSTALLATION PLAN -  
LAKE STREET @ HILLSIDE AVENUE
7. CABLE PLAN, PHASE DESIGNATION DIAGRAM  
AND SCHEDULE OF QUANTITIES -  
LAKE STREET @ HILLSIDE AVENUE
8. SEQUENCE OF OPERATIONS, EMERGENCY VEHICLE  
PRE-EMPTION SEQUENCE OF OPERATIONS  
LAKE STREET @ HILLSIDE AVENUE
9. MEDIAN REMOVAL AND REPLACEMENT PLAN
10. MAST ARM MOUNTED STREET NAME SIGNS
- 11-13. CONSTRUCTION DETAILS



LOCATION MAP



**METRO TRANSPORTATION GROUP, INC.**  
TRAFFIC ENGINEERING, TRANSPORTATION PLANNING  
AND SIGNAL SYSTEMS/DESIGN

3100 W. HIGGINS ROAD, HOFFMAN ESTATES, IL 60195 PH# 630 213-1000

NO.	DATE	REVISIONS
		DESCRIPTION

### TITLE SHEET

LAKE STREET @ HILLSIDE AVENUE  
GRAYSLAKE, ILLINOIS

FILE NAME: 01-TRA-001  
DATE: SEPT 14, 2002  
SHEET NO.: 1

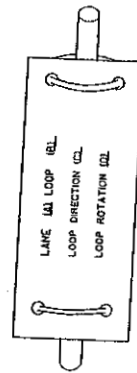
EXHIBIT

Tables

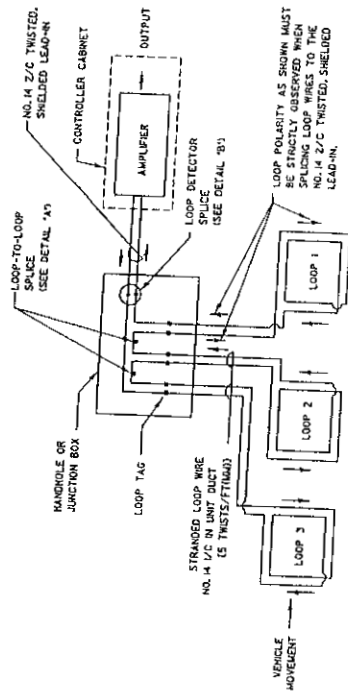


PLANT	SECTION	COUNTY	TO STATE
STA.	TO STA.		
FED. ROAD DIST. NO. 1	ELLIMOS	FED. AID PROJ. NO.	

- LOOP LEAD-IN CABLE TAG

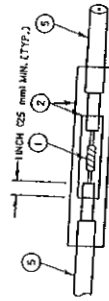


- A. LANE 1 IS THE LANE CLOSEST TO THE CENTERLINE OF THE ROADWAY
- B. LOOP 1 IS THE LOOP IN THE LANE CLOSEST TO THE INTERSECTION.
- C. LABEL LOOP CABLE "N" OR LOOP CABLE "OUT".
- D. LABEL LOOP CABLE CLOCKWISE OR LOOP CABLE COUNTERCLOCKWISE.

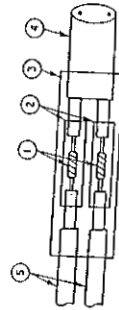


DETECTOR LOOP WIRING SCHEMATIC

- LOOPS SHALL BE SPLICED IN SERIES.
- SAW-CUTS SHALL BE A MINIMUM WIDTH OF 5/16" (8 mm).
- SAW-CUT DEPTHS SHALL BE 3/16" (5 mm) IN CONCRETE. THE SAW-CUT DEPTH SHALL BE TO THE TOP OF THE REINFORCEMENT.
- LOOP CORNERS SHALL BE DRILLED WITH A 2" (50 mm) DIAMETER CORE.



DETAIL "A"  
LOOP-TO-LOOP SPLICE



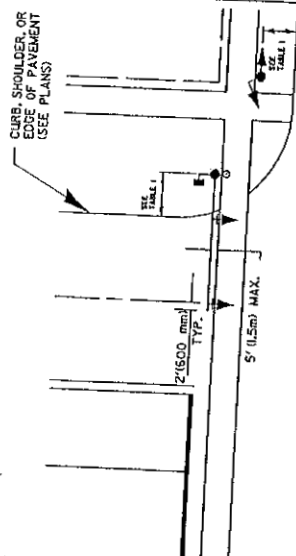
DETAIL "B"  
LOOP-TO-CONTROLLER SPICE

- ① LOOP DETECTOR SPALICE
- ② WESTERN UNION SPALICE SOLDERED WITH ROBIN CORE FLOW. ALL EXPOSED SURFACES OF THE SOLDER SHALL BE SMOOTH.
- ③ NCSN 30/70D HEAT SHRINK TUBE MINIMUM LENGTH 3" (75 mm). UNDERWATER GRADE.
- ④ NCSN 200/75D HEAT SHRINK TUBE MINIMUM LENGTH 8" (203 mm). UNDERWATER GRADE.
- ⑤ NO.14 2/C TWISTED, SHELVEZED CABLE.
- ⑥ LOOP CONDUCTOR WITH FLEXIBLE PLASTIC TUBE

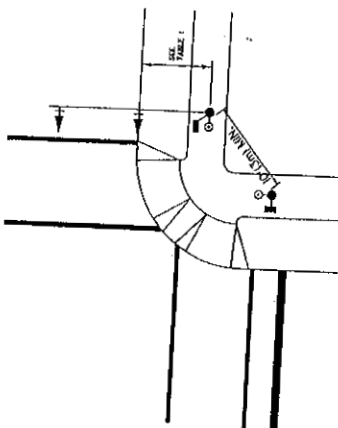
- ① WESTERN UNION SPlice SOLDIERED WITH ROSIN CORE FLUX. ALL EXPOSED SURFACES OF THE SOLDER SHALL BE SMOOTH.
- ② RESIN 300/750 HEAT SHRINK TUBE MINIMUM LENGTH 3" (75 mm) UNDERWATER GRADE.
- ③ RES 300/750 HEAT SHRINK TUBE MINIMUM LENGTH 6" (150 mm) UNDERWATER GRADE.
- ④ NO.14 2/C TWISTED, SHIELDED CABLE.
- ⑤ LOOP CONDUCTOR WITH 6" (150 mm) MINIMUM LENGTH.



**TRAFFIC SIGNAL MAST ARM AND POST**  
MAST ARM MOUNTED SIGNAL IN PROPOSED  
& FUTURE SIDEWALK AREA INTERSECTION  
SHOWN WITH PEDESTRIAN SIGNAL AND  
PUSHBUTTON DETECTOR

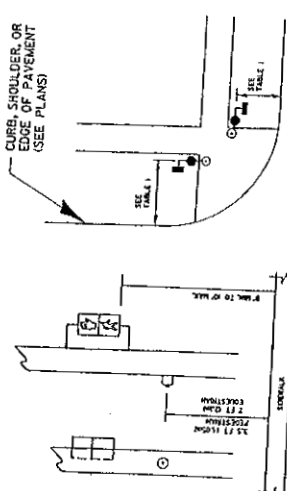


**PEDESTRIAN SIGNAL PUSHBUTTON**



RECOMMENDED PUSHBUTTON LOCATIONS FOR ACCESSIBLE PEDESTRIAN SIGNALS  
SHALL BE IN ACCORDANCE WITH THE CURRENT ADOPTED (SEE NOTE 1) TO MEET  
MUTED REQUIREMENTS FOR PEDESTRIAN SIGNAL PUSHBUTTONS MAY HAVE TO BE  
MOUNTED ON A SEPARATE POST.

**PEDESTRIAN SIGNAL POST**  
PEDESTRIAN SIGNAL HEAD  
AND PEDESTRIAN PUSHBUTTON  
DETECTOR LOCATION



**TABLE 1**

TRAFFIC SIGNAL EQUIPMENT	COMBINATION CONCRETE CURB AND CUTTER (MIN. DIST. FROM BACK OF CURB)	SHOULDER/NON-CURBED AREA (MIN. DIST. FROM EDGE OF PAVEMENT)
TRAFFIC SIGNAL MAST ARM POLE	6 FT (1.8m)	SHOULDER WIDTH + 2 FT (0.6m) MINIMUM (OPT 13.0m)
TRAFFIC SIGNAL POST	4 FT (1.2m)	SHOULDER WIDTH + 2 FT (0.6m) MINIMUM (OPT 13.0m)
PEDESTRIAN SIGNAL POST	4 FT (1.2m)	SHOULDER WIDTH + 2 FT (0.6m) MINIMUM (OPT 13.0m)
PEDESTRIAN PUSHBUTTON	SEE NOTE 1	SEE NOTE 1

**NOTES:**

1. AT ACCESSIBLE PEDESTRIAN SIGNAL LOCATIONS WITH PEDESTRIAN ACTIVATION, EACH PUSHBUTTON SHALL ACTIVATE BOTH THE WALK INTERVAL AND THE ACCESSIBLE PEDESTRIAN SIGNALS.  
AT ACCESSIBLE PEDESTRIAN SIGNAL LOCATIONS, PUSHBUTTONS SHOULD CLEARLY INDICATE WHICH CROSSWALK SIGNAL IS ACTIVATED. PUSHBUTTONS SHOULD BE MOUNTED AT A POINT IN THE SAME DIRECTION FOR ACCESSIBLE DESIGN FROM THE CURB OR SHOULDER. PROVIDED, THE ACCESSIBLE PEDESTRIAN SIGNALS AT CORNERS OF SIGNALIZED INTERSECTIONS SHOULD BE SEPARATED BY THE DISTANCE PUSHBUTTONS ARE APPROPRIATE. PEDESTRIAN SIGNALS HAVE VISUAL INDICATORS TO DISTINGUISH AND LOCATE THE PUSHBUTTONS FOR ACCESSIBLE PEDESTRIAN SIGNALS.  
A. ADJACENT TO LEVEL ALL-WEATHER SURFACE TO PROVIDE ACCESS FROM A CURB, SHOULDER, OR PAVEMENT.  
B. WITHIN 5 FT (1.5m) OF THE CROSSWALK EXTENSION.  
C. WITHIN 10 FT (3m) OF THE EDGE OF CURB, SHOULDER, OR PAVEMENT.  
D. PARALLEL TO THE CROSSWALK TO BE USED (SEE MUTED FIGURE 4E-2).  
E. ABOVE ADJACENT SIDEWALK.  
F. PEDESTRIAN SIGNAL FACES SHALL BE MOUNTED WITH THE BOTTOM OF THE SIGNAL NOT LESS THAN 8 FT (2.4m) NOR MORE THAN 15 FT (4.5m) ABOVE THE SIDEWALK OR ABOVE THE PAVEMENT GRADE AT THE CENTER OF THE HIGHWAY IF NO SIDEWALKS EXIST.
2. THE BOTTOM OF THE HOUSING OF A VEHICLE SIGNAL FACE MOUNTED OVER A ROADWAY SHALL BE AT LEAST 10 FT (3.0m) ABOVE THE SIDEWALK OR ABOVE THE PAVEMENT GRADE AT THE CENTER OF THE HIGHWAY IF NO SIDEWALKS EXIST.
3. THE BOTTOM OF THE HOUSING OF A VEHICLE SIGNAL FACE MOUNTED OVER A ROADWAY SHALL BE AT LEAST 10 FT (3.0m) ABOVE THE SIDEWALK OR ABOVE THE PAVEMENT GRADE AT THE CENTER OF THE HIGHWAY IF NO SIDEWALKS EXIST.
4. THE BOTTOM OF THE HOUSING OF A VEHICLE SIGNAL FACE MOUNTED OVER A ROADWAY SHALL BE AT LEAST 10 FT (3.0m) ABOVE THE SIDEWALK OR ABOVE THE PAVEMENT GRADE AT THE CENTER OF THE HIGHWAY IF NO SIDEWALKS EXIST.

REVISIONS	DATE

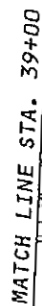












THE LIGHT DETECTORS AND LIGHT  
 DETECTOR AMPLIFIER FOR THIS  
 PROJECT SHALL BE "TOMAR" TO  
 MEET LOCAL FIRE DEPARTMENT  
 REQUIREMENTS.

**METRO TRANSPORTATION GROUP, INC.**  
TRAFFIC ENGINEERING, TRANSPORTATION PLANNING  
AND SIGNAL SYSTEMS

3100 W. HIGGINS ROAD,  
AND SIGNAL SYSTEMS/DESIGN  
TRANSPORTATION PLANNING  
HOFFMAN ESTATES, IL 60195  
PHW 630 213-1000

[illegible]

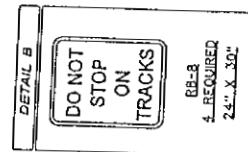
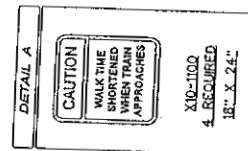
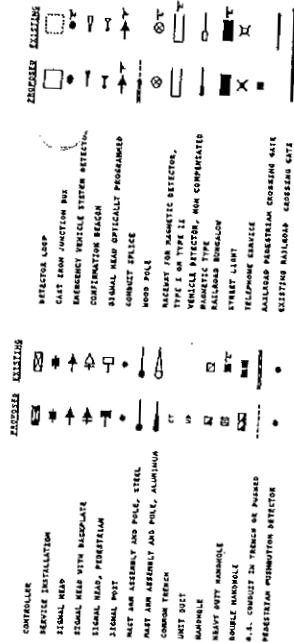
TRAFFIC SIGNAL AND RAILROAD  
INTERCONNEI INSTALLATION PLAN

FILE NAME:	06-89-009	DATE:	EPT 14, 2005	PROJECT NO.:	NO411-07
SHEET NO.:			6	OF 7	



SCALE: 1"=20'

### TRAFFIC SIGNAL LEGEND



RESTRICTION OF WORK AREA. RESTRICTION OF THE TRAFFIC SIGNAL WORK AREA SHALL BE INCIDENTAL TO THE RELATED PAY WITH SUCH AS FOUNDATION, CONDUIT, MANHOLE, TRENCH, AND BACKFILL, ETC., AND NO EXTRA COMPENSATION SHALL BE ALLOWED. ALL ROADWAY SURFACES SUCH AS SHOULDER, MEDIAN, SIDEWALKS, DRIVEWAYS, ETC., SHALL BE REPLACED IN KIND. ALL DAMAGE TO UNDERGROUND UTILITIES, STRUCTURES, OR EQUIPMENT MUST BE REPAIRED AT THE CONTRACTOR'S EXPENSE. ALL DAMAGE TO OVERHEAD LINES SHALL BE REPLACED WITH AN EQUAL SPECIFICATION SIZE AND 250 RESPECTIVELY.



### SCHEDULE OF QUANTITIES

[illegible]

TRAFFIC SIGNAL INSTALLATION ELECTRICAL SERVICE REQUIREMENTS			TRAFFIC SIGNAL SERVICE REQUIREMENTS		TOTAL TRAFFIC	
TYPE SIGNAL	NO. OF LAMP/REQUIREMENTS	WATTAGE	NO. OF LAMP/REQUIREMENTS	WATTAGE	NO. OF LAMP/REQUIREMENTS	WATTAGE
RED	1	100	1	100	2	200
YELLOW	1	100	1	100	2	200
GREEN	1	100	1	100	2	200
ARROW GREEN	4	100	4	100	8	800
ARROW RED	4	100	4	100	8	800
PEDESTRIAN SIGNAL	4	100	4	100	8	800
CONTROLLED	1	100	1	100	2	200
FLASHER	2	200	2	200	4	400
FLASHER	2	200	2	200	4	400

ENERGY COSTS TO:  
VILLAGE OF MANOVER PARK  
2121 W. LAKE ST  
MANOVER PARK, ILL 60133  
ENERGY SUPPLY - CONTACT: JUDY KNELL  
PHONE: (630) 601-1602



34-11100-1	34-11100-2	34-11100-3	34-11100-4	34-11100-5	34-11100-6	34-11100-7	34-11100-8	34-11100-9	34-11100-10	34-11100-11	34-11100-12	34-11100-13	34-11100-14	34-11100-15	34-11100-16	34-11100-17	34-11100-18	34-11100-19	34-11100-20	34-11100-21	34-11100-22	34-11100-23	34-11100-24	34-11100-25	34-11100-26	34-11100-27	34-11100-28	34-11100-29	34-11100-30	34-11100-31	34-11100-32	34-11100-33	34-11100-34	34-11100-35	34-11100-36	34-11100-37	34-11100-38	34-11100-39	34-11100-40	34-11100-41	34-11100-42	34-11100-43	34-11100-44	34-11100-45	34-11100-46	34-11100-47	34-11100-48	34-11100-49	34-11100-50	34-11100-51	34-11100-52	34-11100-53	34-11100-54	34-11100-55	34-11100-56	34-11100-57	34-11100-58	34-11100-59	34-11100-60	34-11100-61	34-11100-62	34-11100-63	34-11100-64	34-11100-65	34-11100-66	34-11100-67	34-11100-68	34-11100-69	34-11100-70	34-11100-71	34-11100-72	34-11100-73	34-11100-74	34-11100-75	34-11100-76	34-11100-77	34-11100-78	34-11100-79	34-11100-80	34-11100-81	34-11100-82	34-11100-83	34-11100-84	34-11100-85	34-11100-86	34-11100-87	34-11100-88	34-11100-89	34-11100-90	34-11100-91	34-11100-92	34-11100-93	34-11100-94	34-11100-95	34-11100-96	34-11100-97	34-11100-98	34-11100-99	34-11100-100
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3100 W. HIGGINS ROAD, HOFFMAN ESTATES, IL 60195 PH# 630 213-1000  
AND SIGNAL SYSTEMS/DESIGN

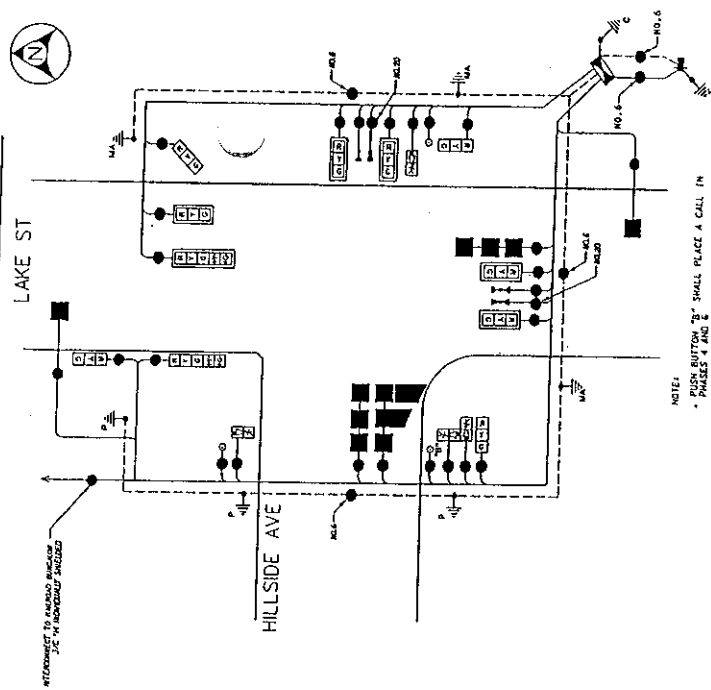
### CABLE PLAN & LEGEND

8-1200M TRAFFIC SIGNAL SECTION  
1200M TRAFFIC SIGNAL SECTION  
1200M PEDESTRIAN SIGNAL SECTION  
1200M PEDESTRIAN SIGNAL SECTION  
CONTROLLER CABINET  
SERVICE INSTALLATION  
TELEPHONE CONNECTION  
VEHICLE DETECTOR INDUCTION LOOP  
MAGNETIC DETECTOR  
EMERGENCY VEHICLE LIGHT - DETECTION  
COMPARISON SEASON  
CONVENTION DETECTOR  
CONVENTION DETECTOR  
ALL CABLE MUST BE SHIELDED.  
CHASSIS GROUNDING SHALL BE SHIELDED.  
NO. 62.5/125 MM 187 & 3M 127 FIBER OPTIC CABLE

SIGNAL FACE WITH BACKPLATE  
P INDICATES PROGRAMMED HEAD

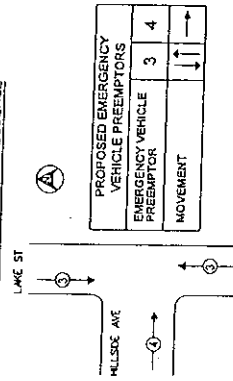
RAILROAD CONTROL CABINET  
ILLUMINATED SIGN PANEL OPTIC  
NO LEFT TURN  
NO RIGHT TURN  
NO AHEAD SIGN PANEL OPTIC  
CONTROLLER (C)  
GRANDS ROD AT HANGABLE HANGABLE HANGABLE HANG OR  
GRANDS ROD AT ELECTRIC SIGN PANEL HANG  
GRANDS ROD AT POST OF MAST ARM PILE HANG  
GRANDS ROD AT PESTER SIGN INSTALLATION

**ALL INDICATIONS SHALL BE LED**

PROPOED CABLE PLAN

NOTE:

## EMERGENCY VEHICLE PREEMPTION SEQUENCE



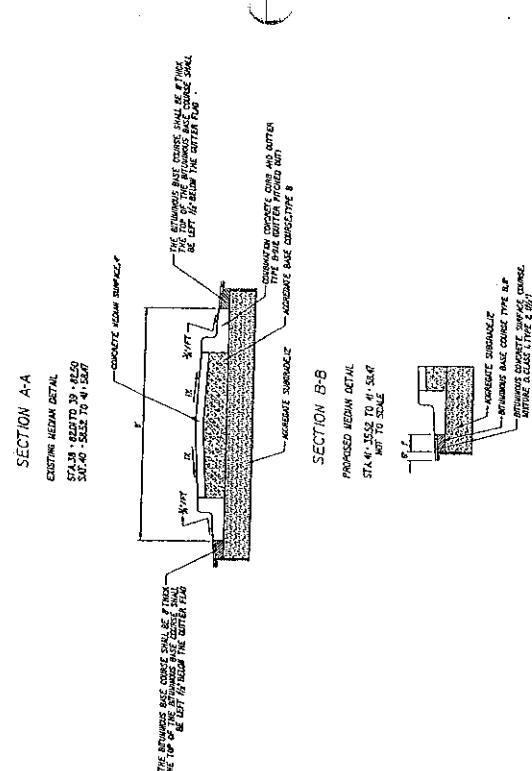
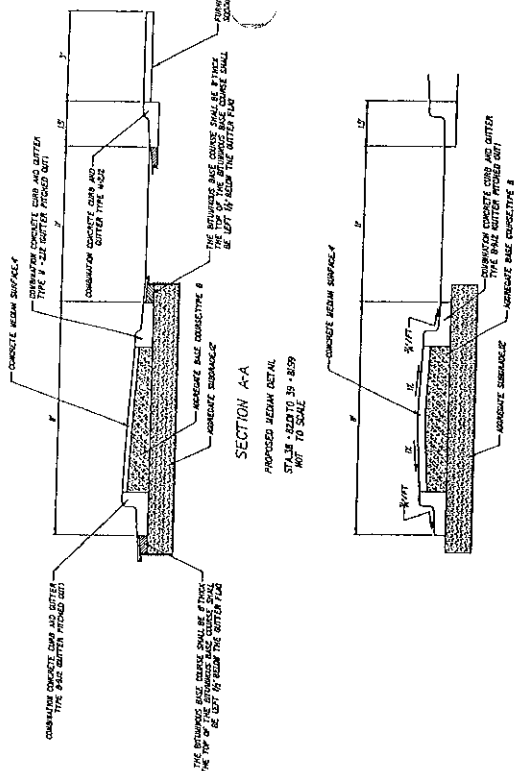
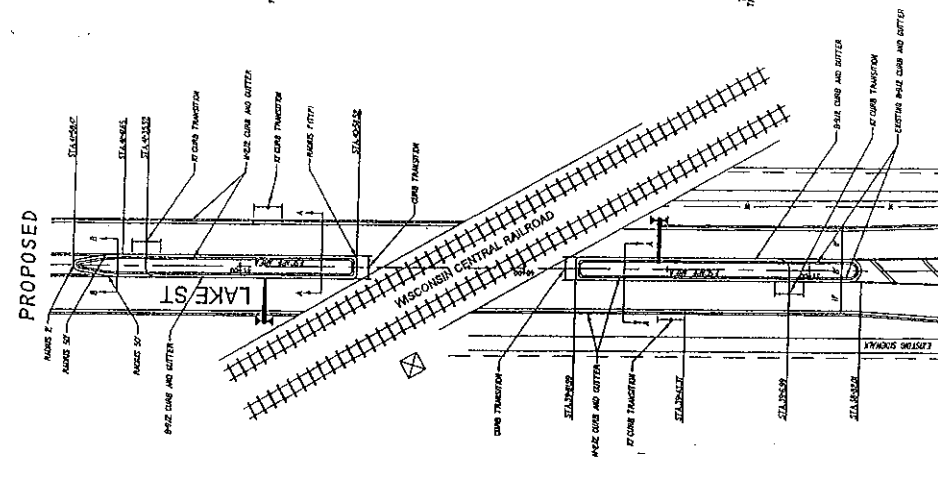
PROPOSED EMERGENCY VEHICLE PREEMPTORS	3	4	
EMERGENCY VEHICLE PREEMPTOR			
MOVEMENT			→



# PROPOSED NORMAL SEQUENCE OF OPERATIONS

MOVEMENT	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61	62	63	64	65	66	67	68	69	70	71	72	73	74	75	76	77	78	79	80	81	82	83	84	85	86	87	88	89	90	91	92	93	94	95	96	97	98	99	100	101	102	103	104	105	106	107	108	109	110	111	112	113	114	115	116	117	118	119	120	121	122	123	124	125	126	127	128	129	130	131	132	133	134	135	136	137	138	139	140	141	142	143	144	145	146	147	148	149	150	151	152	153	154	155	156	157	158	159	160	161	162	163	164	165	166	167	168	169	170	171	172	173	174	175	176	177	178	179	180	181	182	183	184	185	186	187	188	189	190	191	192	193	194	195	196	197	198	199	200	201	202	203	204	205	206	207	208	209	210	211	212	213	214	215	216	217	218	219	220	221	222	223	224	225	226	227	228	229	230	231	232	233	234	235	236	237	238	239	240	241	242	243	244	245	246	247	248	249	250	251	252	253	254	255	256	257	258	259	260	261	262	263	264	265	266	267	268	269	270	271	272	273	274	275	276	277	278	279	280	281	282	283	284	285	286	287	288	289	290	291	292	293	294	295	296	297	298	299	300	301	302	303	304	305	306	307	308	309	310	311	312	313	314	315	316	317	318	319	320	321	322	323	324	325	326	327	328	329	330	331	332	333	334	335	336	337	338	339	340	341	342	343	344	345	346	347	348	349	350	351	352	353	354	355	356	357	358	359	360	361	362	363	364	365	366	367	368	369	370	371	372	373	374	375	376	377	378	379	380	381	382	383	384	385	386	387	388	389	390	391	392	393	394	395	396	397	398	399	400	401	402	403	404	405	406	407	408	409	410	411	412	413	414	415	416	417	418	419	420	421	422	423	424	425	426	427	428	429	430	431	432	433	434	435	436	437	438	439	440	441	442	443	444	445	446	447	448	449	450	451	452	453	454	455	456	457	458	459	460	461	462	463	464	465	466	467	468	469	470	471	472	473	474	475	476	477	478	479	480	481	482	483	484	485	486	487	488	489	490	491	492	493	494	495	496	497	498	499	500	501	502	503	504	505	506	507	508	509	510	511	512	513	514	515	516	517	518	519	520	521	522	523	524	525	526	527	528	529	530	531	532	533	534	535	536	537	538	539	540	541	542	543	544	545	546	547	548	549	550	551	552	553	554	555	556	557	558	559	560	561	562	563	564	565	566	567	568	569	570	571	572	573	574	575	576	577	578	579	580	581	582	583	584	585	586	587	588	589	590	591	592	593	594	595	596	597	598	599	600	601	602	603	604	605	606	607	608	609	610	611	612	613	614	615	616	617	618	619	620	621	622	623	624	625	626	627	628	629	630	631	632	633	634	635	636	637	638	639	640	641	642	643	644	645	646	647	648	649	650	651	652	653	654	655	656	657	658	659	660	661	662	663	664	665	666	667	668	669	670	671	672	673	674	675	676	677	678	679	680	681	682	683	684	685	686	687	688	689	690	691	692	693	694	695	696	697	698	699	700	701	702	703	704	705	706	707	708	709	710	711	712	713	714	715	716	717	718	719	720	721	722	723	724	725	726	727	728	729	730	731	732	733	734	735	736	737	738	739	740	741	742	743	744	745	746	747	748	749	750	751	752	753	754	755	756	757	758	759	760	761	762	763	764	765	766	767	768	769	770	771	772	773	774	775	776	777	778	779	780	781	782	783	784	785	786	787	788	789	790	791	792	793	794	795	796	797	798	799	800	801	802	803	804	805	806	807	808	809	810	811	812	813	814	815	816	817	818	819	820	821	822	823	824	825	826	827	828	829	830	831	832	833	834	835	836	837	838	839	840	841	842	843	844	845	846	847	848	849	850	851	852	853	854	855	856	857	858	859	860	861	862	863	864	865	866	867	868	869	870	871	872	873	874	875	876	877	878	879	880	881	882	883	884	885	886	887	888	889	890	891	892	893	894	895	896	897	898	899	900	901	902	903	904	905	906	907	908	909	910	911	912	913	914	915	916	917	918	919	920	921	922	923	924	925	926	927	928	929	930	931	932	933	934	935	936	937	938	939	940	941	942	943	944	945	946	947	948	949	950	951	952	953	954	955	956	957	958	959	960	961	962	963	964	965	966	967	968	969	970	971	972	973	974	975	976	977	978	979	980	981	982	983	984	985	986	987	988	989	990	991	992	993	994	995	996	997	998	999	1000	1001	1002	1003	1004	1005	1006	1007	1008	1009	1010	1011	1012	1013	1014	1015	1016	1017	1018	1019	1020	1021	1022	1023	1024	1025	1026	1027	1028	1029	1030	1031	1032	1033	1034	1035	1036	1037	1038	1039	1040	1041	1042	1043	1044	1045	1046	1047	1048	1049	1050	1051	1052	1053	1054	1055	1056	1057	1058	1059	1060	1061	1062	1063	1064	1065	1066	1067	1068	1069	1070	1071	1072	1073	1074	1075	1076	1077	1078	1079	1080	1081	1082	1083	1084	1085	1086	1087	1088	1089	1090	1091	1092	1093	1094	1095	1096	1097	1098	1099	1100	1101	1102	1103	1104	1105	1106	1107	1108	1109	1110	1111	1112	1113	1114	1115	1116	1117	1118	1119	1120	1121	1122	1123	1124	1125	1126	1127	1128	1129	1130	1131	1132	1133	1134	1135	1136	1137	1138	1139	1140	1141	1142	1143	1144	1145	1146	1147	1148	1149	1150	1151	1152	1153	1154	1155	1156	1157	1158	1159	1160	1161	1162	1163	1164	1165	1166	1167	1168	1169	1170	1171	1172	1173	1174	1175	1176	1177	1178	1179	1180	1181	1182	1183	1184	1185	1186	1187	1188	1189	1190	1191	1192	1193	1194	1195	1196	1197	1198	1199	1200	1201	1202	1203	1204	1205	1206	1207	1208	1209	1210	1211	1212	1213	1214	1215	1216	1217	1218	1219	122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CONSTRUCTION NOTES

LEGEND

REMOVAL CURB & GUTTER

FAUCET

CONCRETE MEDIAN SURFACE, 4" AND 1/2" BASE COURSE, TYPE B REMOVAL

PAVEMENT REMOVAL, 20" DEPTH




**METRO TRANSPORTATION GROUP, INC.**  
TRAFFIC ENGINEERING, TRANSPORTATION PLANNING  
AND SIGNAL SYSTEMS/DESIGN  
3100 W. HIGGINS ROAD  
CHICAGO, ILL. 60644

3100 W. HIGGINS ROAD,  
AND SIGNAL SYSTEMS/DESIGN  
HOFFMAN ESTATES, IL 60195  
PH# 630 213-1000

[illegible]

**MEDIAN REMOVAL AND REPLACEMENT PLAN**

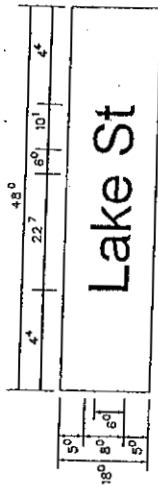
LAKE STREET @ HILLSIDE AVENUE  
GRAYSLAKE, ILLINOIS

FILE NAME	09-sp.dgn	<div style="text-align: center;">  </div>
DATE	SEPT 14, 2005	
PROJECT NO.	MO411-07	

SHEET NO. OF

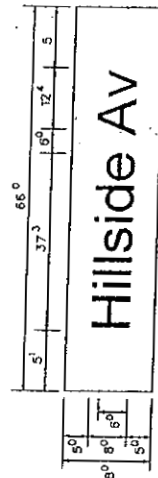


PANEL SIGN DESIGN, TYPE 1



NOTE: SIGN DIMENSIONS ARE IN ENGLISH UNITS

PANEL SIGN DESIGN, TYPE 1



# GENERAL NOTES

- WHERE MAST ARM MOUNTED STREET NAME SIGNS ARE SPECIFIED THE MAST ARM ASSEMBLY AND POLES SHALL BE DESIGNED TO SUPPORT THE LOADS CALLED FOR ON STANDARD SIGN BACKS. THE DESIGN SHALL BE IN ACCORDANCE WITH THE REQUIREMENTS OF THE COMPTON TEST AS SHOWN. THE DESIGN SHALL BE IN ACCORDANCE WITH THE REQUIREMENTS OF THE COMPTON TEST AS SHOWN. THE DESIGN SHALL BE IN ACCORDANCE WITH THE REQUIREMENTS OF THE COMPTON TEST AS SHOWN.
- ALL SIGNS SHALL BE WHITE REFLECTORIZED LETTERS AND BORDER ON A GREEN REFLECTORIZED BACKGROUND.
- THE SIGN LENGTH SHOULD BE INCREASED IN 6-INCH INCREMENTS, BUT THE OVERALL LENGTH SHOULD NOT EXCEED 10 FEET.
- ALL SIGNS SHALL BE 30 INCHES AND CARRIER RADIUS SHALL BE 24 INCHES.
- SIGNET ALUMINUM CHANNEL FRAMING SYSTEM SHALL BE USED FOR ALL SIGNS ATTACHED TO SIGNAL POLES AND OTHER BRANDS OF MOUNTING HIGHER AIR ASSEMBLY FOR THE DEPARTMENT'S APPROVAL AND COMPATIBILITY WITH THE CHANNEL/BACKET OF THE ABOVE PRODUCT.

1. WHERE MAST ARM MOUNTED STREET NAME SIGNS ARE SPECIFIED THE MAST ARM ASSEMBLY AND POLES SHALL BE DESIGNED TO SUPPORT THE LOADS CALLED FOR ON STANDARD SIGN BACKS. THE DESIGN SHALL BE IN ACCORDANCE WITH THE REQUIREMENTS OF THE COMPTON TEST AS SHOWN. THE DESIGN SHALL BE IN ACCORDANCE WITH THE REQUIREMENTS OF THE COMPTON TEST AS SHOWN. THE DESIGN SHALL BE IN ACCORDANCE WITH THE REQUIREMENTS OF THE COMPTON TEST AS SHOWN.

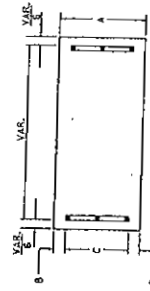
2. ALL SIGNS SHALL BE WHITE REFLECTORIZED LETTERS AND BORDER ON A GREEN REFLECTORIZED BACKGROUND.

3. THE SIGN LENGTH SHOULD BE INCREASED IN 6-INCH INCREMENTS, BUT THE OVERALL LENGTH SHOULD NOT EXCEED 10 FEET.

4. ALL SIGNS SHALL BE 30 INCHES AND CARRIER RADIUS SHALL BE 24 INCHES.

5. SIGNET ALUMINUM CHANNEL FRAMING SYSTEM SHALL BE USED FOR ALL SIGNS ATTACHED TO SIGNAL POLES AND OTHER BRANDS OF MOUNTING HIGHER AIR ASSEMBLY FOR THE DEPARTMENT'S APPROVAL AND COMPATIBILITY WITH THE CHANNEL/BACKET OF THE ABOVE PRODUCT.

## SUPPORTING CHANNELS

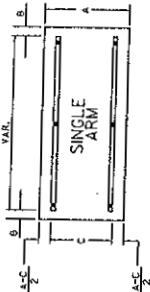


— 50 M. each  
— 50 Ft. each  
— Required  
Design Series D.

18" 6" 48"

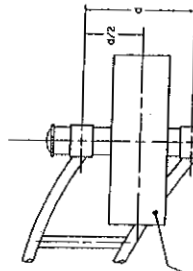
18" 6" 48"

## SUPPORTING CHANNELS



— 50 M. each  
— 50 Ft. each  
— Required  
Design Series D.

18" 6" 48"



Secure Sign to Mast Arm

18" 6" 48"

18" 6" 48"

Upper Case To Lower Case

Spacing Chart 8-4 inch Series 'C' & 'D'

SECOND LETTER		J		S		T		V		Y		X		Z	
SERIES	W	X	Y	Z	A	B	C	D	E	F	G	H	I	J	K
A W X	12	14	15	16	17	18	19	20	21	22	23	24	25	26	27
B	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28
C E G	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28
D O R	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28
F	05	06	07	08	09	10	11	12	13	14	15	16	17	18	19
H I M N	20	21	22	23	24	25	26	27	28	29	30	31	32	33	34
J U	20	21	22	23	24	25	26	27	28	29	30	31	32	33	34
K L	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25
P	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26
S	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26
T	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26
V	06	07	08	09	10	11	12	13	14	15	16	17	18	19	20
Y	03	04	05	06	07	08	09	10	11	12	13	14	15	16	17
Z	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30

Lower Case To Lower Case

Spacing Chart 6 inch Series 'C' & 'D'

SECOND LETTER		J		S		T		V		Y		X		Z	
SERIES	W	X	Y	Z	A	B	C	D	E	F	G	H	I	J	K
A W X	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30
B	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30
D F K P S	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26
C G	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26
T	06	07	08	09	10	11	12	13	14	15	16	17	18	19	20
V Y	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25
W	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25
X	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26

Number To Number

Spacing Chart 8 inch Series 'C' & 'D'

SECOND NUMBER		5		6		7		8		9	
SERIES	0	1	2	3	4	5	6	7	8	9	0
A 0 9	16	17	18	19	20	21	22	23	24	25	26
B 1	20	21	22	23	24	25	26	27	28	29	30
C 2 3 4	16	17	18	19	20	21	22	23	24	25	26
D 5	16	17	18	19	20	21	22	23	24	25	26
E 6	16	17	18	19	20	21	22	23	24	25	26
F 7	16	17	18	19	20	21	22	23	24	25	26
G 8	16	17	18	19	20	21	22	23	24	25	26

18" 6" 48"

18" 6" 48"

FILE NAME	FILE NO.	COUNTY	SECTION	DATE
17A	17A	TO STL	TO STL	TO STL
17A	17A	TO STL	TO STL	TO STL

EXAMPLE, 2 DENOTES 2

UPPER AND LOWER CASE LETTER WIDTHS

6 INCH UPPER CASE LETTERS		8 INCH UPPER CASE LETTERS		6 INCH LOWER CASE LETTERS		8 INCH LOWER CASE LETTERS	
SERIES	W	X	Y	Z	A	B	C
A	36	50	50	48	48	48	48
B	32	40	43	53	53	53	53
C	32	40	43	53	53	53	53
D	32	40	43	53	53	53	53
E	30	35	40	47	47	47	47
F	30	35	40	47	47	47	47
G	32	40	43	53	53	53	53
H	32	40	43	53	53	53	53
I	07	07	11	12	12	12	12
J	30	35	40	50	50	50	50
K	32	40	43	54	54	54	54
L	30	35	40	47	47	47	47
M	37	45	51	61	61	61	61
N	32	40	43	53	53	53	53
O	34	42	45	58	58	58	58
P	32	40	43	53	53	53	53
Q	34	42	45	58	58	58	58
R	32	40	43	53	53	53	53
S	32	40	43	53	53	53	53
T	30	35	40	47	47	47	47
U	32	40	43	53	53	53	53
V	35	44	47	60	60	60	60
W	44	52	60	70	70	70	70
X	34	40	45	53	53	53	53
Y	35	50	50	66	66	66	66
Z	32	40	43	53	53	53	53

6 INCH SERIES

8 INCH SERIES

6 INCH SERIES

8 INCH SERIES

6 INCH SERIES

8 INCH SERIES

6 INCH SERIES

8 INCH SERIES

6 INCH SERIES

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8 INCH SERIES

6 INCH SERIES

8 INCH SERIES

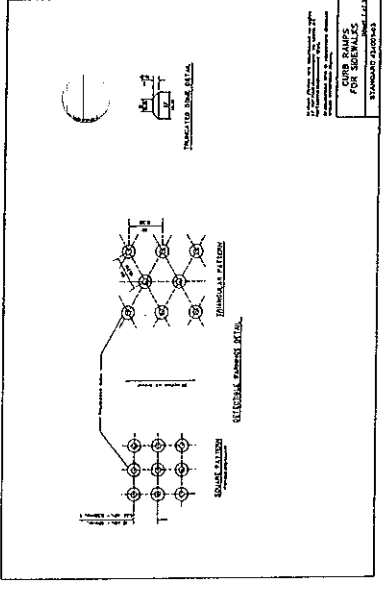
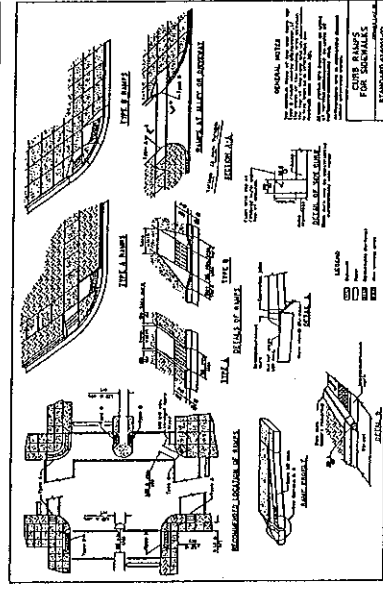
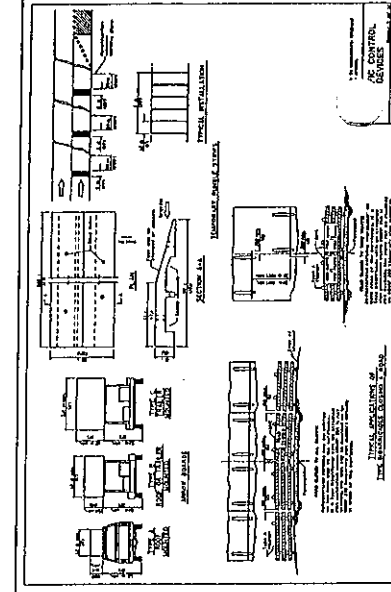
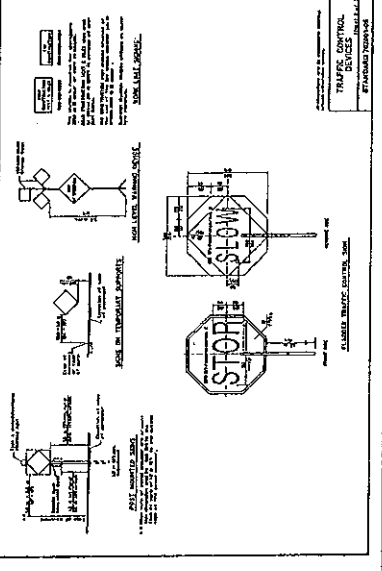
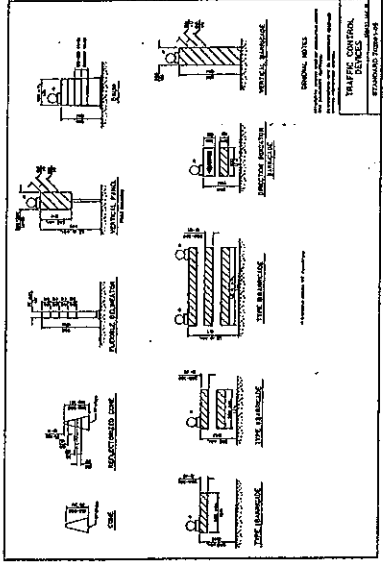
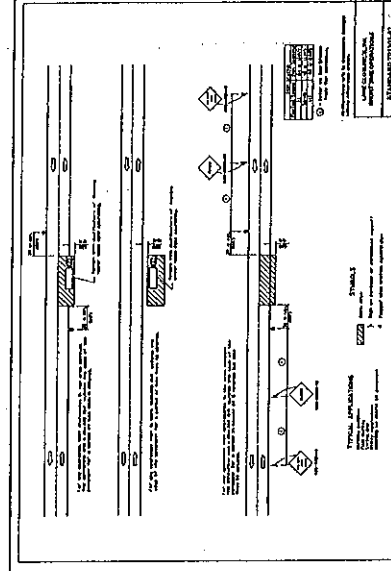
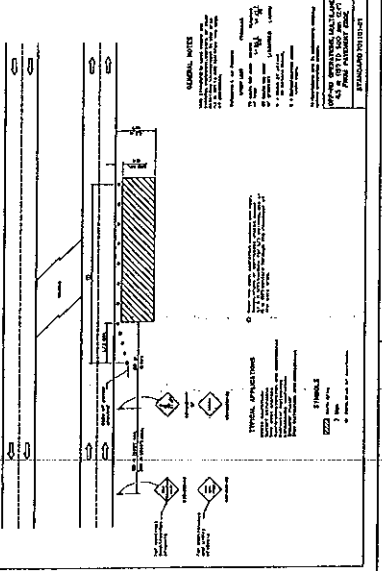
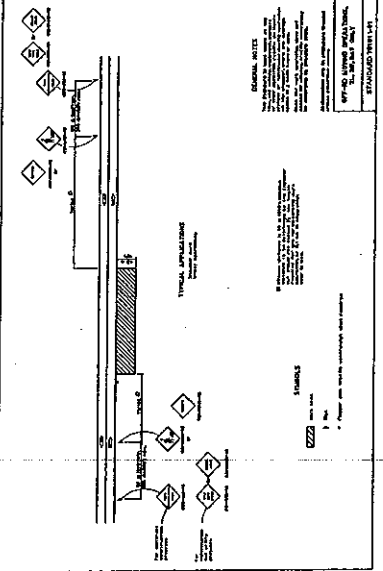
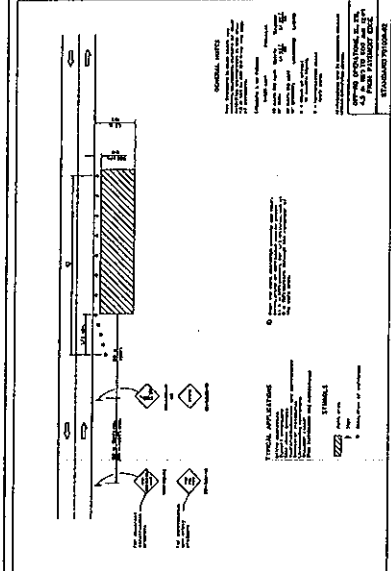
6 INCH SERIES

8 INCH SERIES

6 INCH SERIES

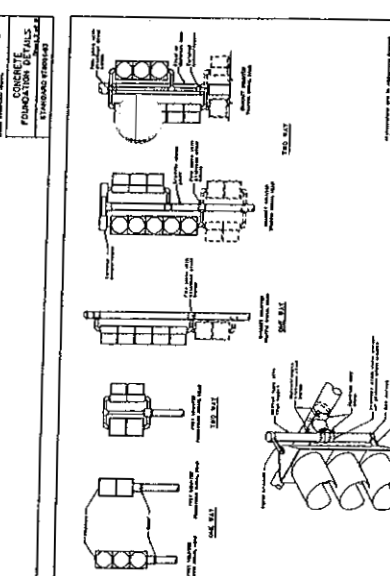
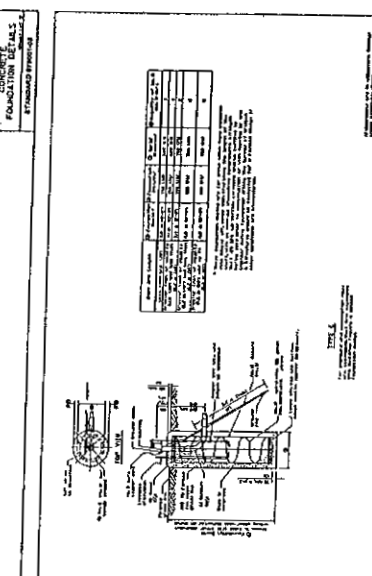
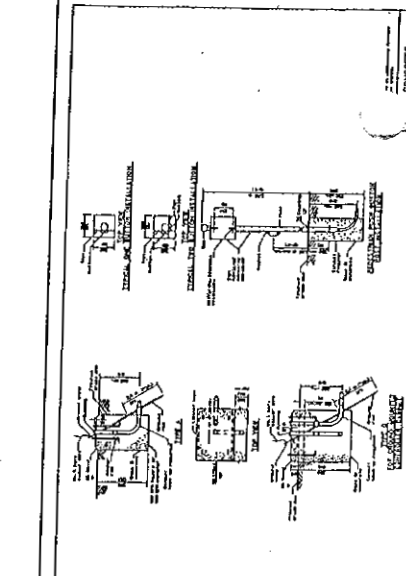
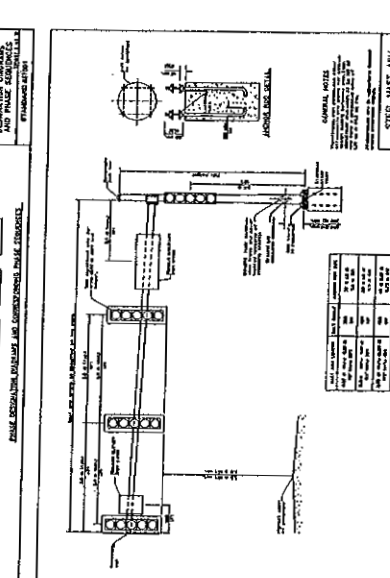
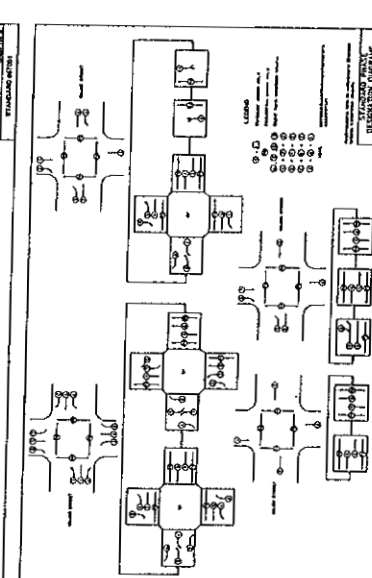
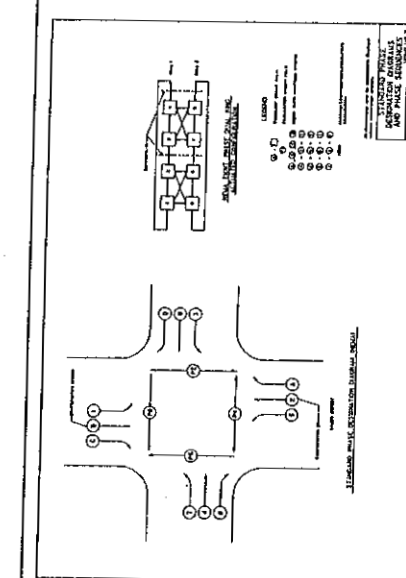
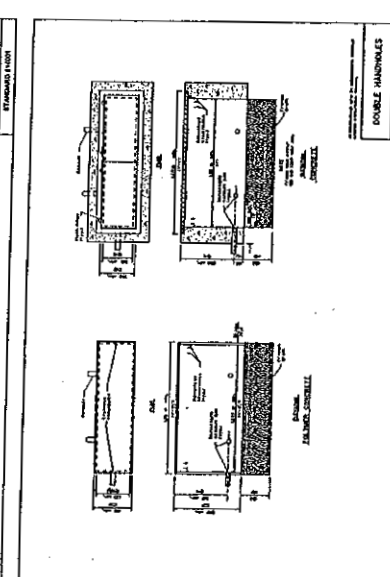
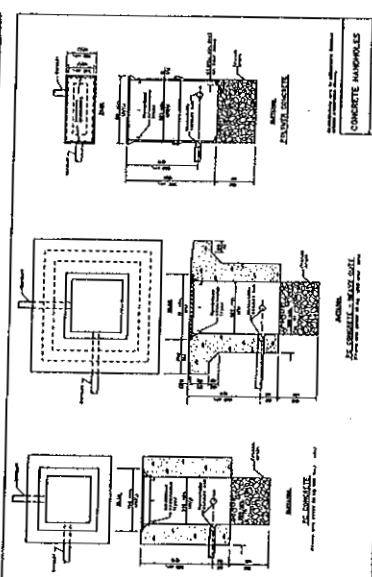
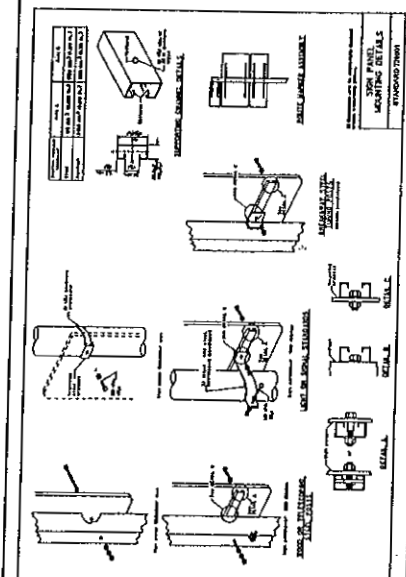
8 INCH SERIES






<b>METRO TRANSPORTATION GROUP, INC.</b> TRAFFIC ENGINEERING, TRANSPORTATION PLANNING AND SIGNAL SYSTEMS/DESIGN 3100 W. HIGGINS ROAD, HOFFMAN ESTATES, IL 60195 PH# 630 213-1000		<b>REVISIONS</b> NO. DATE DESCRIPTION	
		1 10/1/00 1. Initial Design	
<b>CONSTRUCTION DETAILS</b> LAKE STREET @ HILLSIDE AVENUE GRAYSLAKE, ILLINOIS		FILE NAME: 0001-000 DATE: SEPT 14, 2005 PROJECT NO.: 0441-07	SHEET 1







**METRO TRANSPORTATION GROUP, INC.**  
TRAFFIC ENGINEERING, TRANSPORTATION PLANNING  
AND SIGNAL SYSTEMS/DESIGN  
3100 W. HIGGINS ROAD, HOFFMAN ESTATES, IL 60195 PH# 630 213-1000

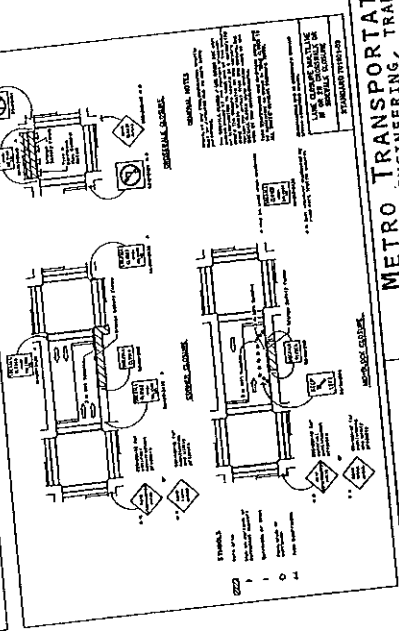
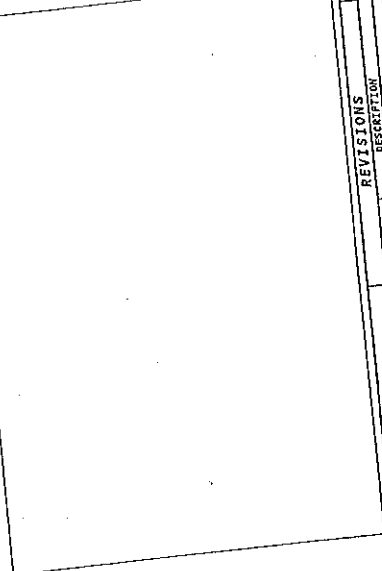
**CONSTRUCTION DETAILS**  
LAKE STREET & HILLSIDE AVENUE  
GRAYSLAKE, ILLINOIS

REVISIONS	
NO.	DESCRIPTION

FILE NAME: 0001-000  
DATE: 10-1-2005  
PROJECT NO: 0001-000

SHEET NO: 1 OF 1



[illegible]

3100 W. HIGGINS ROAD, HOFFMAN ESTATES, IL 60195 PH# 630 213-1000



FILE NAME:	CONF-007	SHEET NO.: 13 OF
DATE:	14. 2005	
EPT		
PROJECT NO.:	NO411-07	

CONSTRUCTION DETAILS

NOTES:

1. Do not place across section of the same species. A medium size may be necessary. Consideration should be given to the following:
2. The maximum length of the specimen should be less than 100 mm. (4 inches).
3. The maximum width of the specimen should be less than 50 mm. (2 inches).
4. The maximum weight of the specimen should be less than 100 gms. (3.5 ounces).
5. The maximum number of specimens per species should be 10.
6. The maximum number of specimens per lot should be 100.
7. The maximum number of specimens per lot should be 100.
8. The maximum number of specimens per lot should be 100.
9. The maximum number of specimens per lot should be 100.
10. The maximum number of specimens per lot should be 100.